

F. L. Oliver,

Wrench.

N^o 83,654.

Patented Nov. 3, 1868.

Fig. 2.

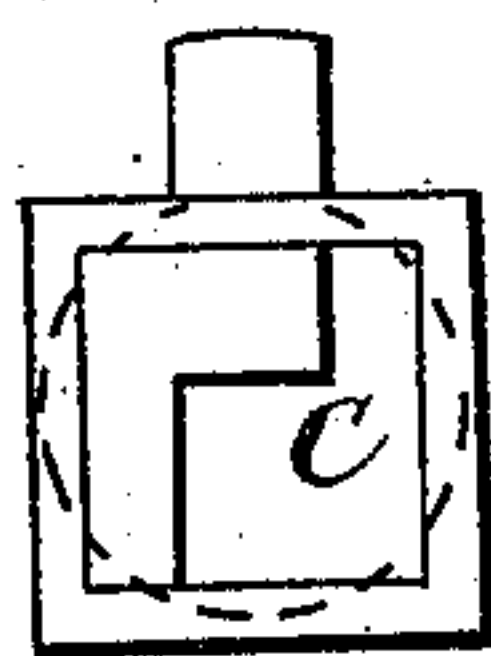
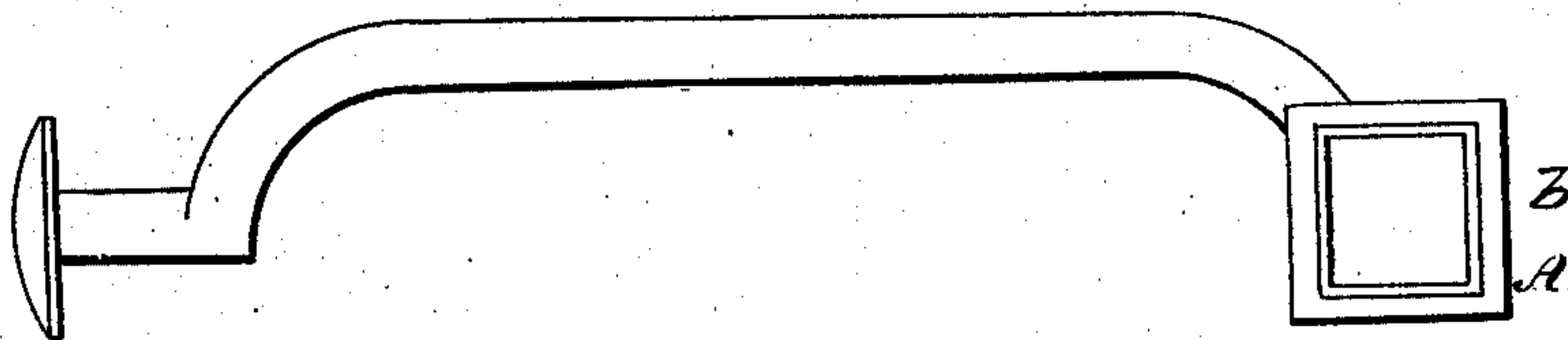


Fig. 1.



Witnesses.

Henry C. Houston,
Am. Franklin Seavey.

Inventor:

Frank L. Oliver
per Wm. H. Clifford atty.

United States Patent Office.

FRANK L. OLIVER, OF SCARBOROUGH, MAINE.

Letters Patent No. 83,654, dated November 3, 1868.

IMPROVEMENT IN WRENCHES.

The Schedule referred to in these Letters Patent and making part of the same.

To all whom it may concern:

Be it known that I, FRANK L. OLIVER, of Scarborough, in the county of Cumberland, and State of Maine, have invented a new and useful Improved Wrench; and I hereby declare the following to be a full, clear, and exact description thereof, which will enable others to make and use my invention, reference being had to the accompanying drawings, forming part of this specification, in which—

Figure 1 shows a side view of my invention.

Figure 2 is an end view of the same.

My invention is designed more particularly for taking off the nuts from the axles of carriages, when it becomes necessary to oil them, or for other purposes. The wrenches now in common use being made with only a long arm, in order to give greater leverage for starting the nut, necessarily take more time to remove it, because of the slow motion, and, in many cases, do not retain their hold of it till it is free of the axle, so that the fingers have to be used before it can be fully removed.

To obviate this difficulty, I curve the handle of the common wrench in the manner shown in the drawing, or its equivalent, and attach to its end, at right angles to it, another wrench of like form. A view of this end is shown at C.

The wrench A is used in starting the nut, as usual. The second wrench, C, is then applied, and turned by the curved handle of A, in the manner of a bit-stock, thus giving a very quick motion, and taking off the nut without using the fingers, or touching it in any way, and it can be laid down without losing its hold of the nut.

What I claim as my invention, and desire to secure by Letters Patent, is—

The improved wrench for carriages, made in the manner and combining the parts herein specified.

FRANK L. OLIVER.

Witnesses:

WM. FRANKLIN SEAVEY,
HENRY C. HOUSTON.